

American

NEWS & VIEWS

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Secretary Clinton Calls for Global Cooperation to End Wildlife Trafficking

By Jane Morse | Staff Writer | 08 November 2012

Washington — Wildlife trafficking is a global issue involving national security, public health and economic security, and requires a concerted global response, says Secretary of State Hillary Rodham Clinton.

At the Partnership Meeting on Wildlife Trafficking held at the State Department November 8, she called on private and government organizations everywhere to join the Coalition Against Wildlife Trafficking, a global partnership for sharing information on poachers and illicit traders. The networks provided by the coalition, she said, are critical to strengthening protection efforts and enhancing cooperation among key countries.

"To build on these efforts, today I'm calling for the creation of a global system of regional wildlife enforcement networks to take advantage of those networks that already are operating and the lessons we have learned from them," Clinton said. To facilitate this, she said, the State Department is pledging \$100,000 to help get this new global system up and running.

In her remarks to an audience of ambassadors to the United States, U.S. lawmakers and representatives from nongovernmental organizations involved in wildlife protection, Clinton said wildlife trafficking relies on "porous borders, corrupt officials and strong networks of organized crime, all of which undermine our mutual security."

"I'm asking the intelligence community to produce an assessment of the impact of large-scale wildlife trafficking on our security interests so we can fully understand what we're up against," she said, adding that organized criminal gangs are well-equipped to exploit the lucrative business of wildlife trafficking. The corruption these gangs foster, Clinton said, sinks deep into local societies. She added: "We have good reason to believe that rebel militias are players in a worldwide ivory market worth millions and millions of dollars a year."

Clinton enumerated the steps the United States is taking to combat wildlife trafficking. These include:

- Working with leaders from around the world to develop a global consensus on wildlife protection.
- Building scientific partnerships. The secretary announced the State Department's three new science envoys — Bernard Amadei, founder of Engineers Without Borders; Susan Hockfield of the Massachusetts Institute of Technology; and evolutionary biologist Barbara Schaal — who will work to create a consensus

with scientists around the world about the best ways to protect endangered wildlife.

- Increasing public support for wildlife protection. "We want to make buying goods, products from trafficked wildlife [and] endangered species unacceptable, socially unacceptable," Clinton said. To this end, U.S. embassies are launching an outreach campaign to raise public awareness about this issue.

- Expanding enforcement. The U.S. Agency for International Development (USAID) has provided more than \$24 million over the past five years for a range of programs that combat wildlife crimes. Last year, USAID launched the ARREST program, which is establishing regional centers of expertise and expanding training programs for law enforcement.

The world's wildlife, Clinton said, is a precious and limited resource that cannot be replenished once it is gone. "Those who profit from it illegally are not just undermining our borders and our economies," she said. "They are truly stealing from the next generation. So we have to work together to stop them and ensure a sustainable future for our wildlife, the people who live with them and the people who appreciate them everywhere."

American Voters Re-elect President Obama

By Stephen Kaufman | Staff Writer | 07 November 2012

Washington — After a closely divided American electorate gave him a second four-year term, President Obama called for unity and appealed to a shared hope for the country's future.

Former Massachusetts Governor Mitt Romney telephoned the president November 7 to concede defeat. After accepting the call, Obama told supporters in Chicago that he is returning to power "more determined and more inspired than ever about the work there is to do and the future that lies ahead."

According to press reports, Obama won 303 electoral votes, and Romney won 206, with Florida's 29 electoral votes still undecided.

Under the U.S. Electoral College system, which assigns votes on a winner-take-all basis to states according to their population, with the exception of Maine and Nebraska, the candidate who wins 270 electoral votes becomes president.

In the November 6 contest, Obama was able to carry important swing states like Ohio, Colorado, Iowa, Pennsylvania, Michigan, Minnesota, Virginia and Wisconsin to help assure his victory, despite lingering American concerns over the state of the U.S. economy.

Obama also won approximately 50 percent of the popular vote, compared to Romney's 48 percent.

Speaking to supporters in Boston November 7, Romney said the United States stands at "a critical point," and cannot risk "partisan bickering and political posturing" as it works to solve its challenges.

"I so wish that I had been able to fulfill your hopes to lead the country in a different direction. But the nation chose another leader," Romney said, and he urged supporters to pray for the president and the country.

"This election is over, but our principles endure. I believe that the principles upon which this nation was founded are the only sure guide to a resurgent economy and to a new greatness," Romney said.

In his remarks, Obama congratulated Romney and said that they had "battled fiercely" for the presidency "because we love this country deeply and we care so strongly about its future," and said he hoped to talk with Romney about "where we can work together to move this country forward."

Addressing supporters, the president said, "Democracy in a nation of 300 million can be noisy and messy and complicated. We have our own opinions. Each of us has deeply held beliefs. And when we go through tough times, when we make big decisions as a country, it necessarily stirs passions, stirs up controversy."

But "these arguments we have are a mark of our liberty, and we can never forget that as we speak, people in distant nations are risking their lives right now just for a chance to argue about the issues that matter — the chance to cast their ballots like we did today," he said.

Appealing for unity, the president said the diverse population of the United States, made up of various ethnic groups, religious communities, income levels, and ideological beliefs, is one "American family" that will "rise or fall together as one nation and as one people."

America's greatness, he said, comes from its people accepting obligations to one another and to the future "so that the freedom which so many Americans have fought for and died for comes with responsibilities as well as rights, and among those are love and charity and duty and patriotism."

Both candidates praised their supporters, campaign donors and volunteers who have offered their time and dedication over many months in the U.S. presidential campaign.

"I don't believe that there's ever been an effort in our

party that can compare with what you have done over these past years. Thank you so very much," Romney said.

Obama told supporters they would have "the lifelong appreciation of a grateful president," and said, "No matter what you do or where you go from here, you will carry the memory of the history we made together."

World Reacts to U.S. Presidential Election

07 November 2012

Washington — Nations around the globe reacted to the re-election of President Obama on November 6.

In the village of Kogelo in western Kenya, where President Obama's father was born, men, women and children sang and danced in the streets. "Kenya, as always, is proud of our association with you," Kenyan President Mwai Kibaki said in a statement. "We look forward to the deepening of relations between our two countries during your second term in office."

German Chancellor Angela Merkel congratulated the president in a letter released by her office. "I have deeply appreciated our many meetings and conversations about all the issues involved in developing the German-American and the trans-Atlantic relationship," Merkel wrote, "not least in overcoming the global financial and economic crisis."

China's state-run news agency, Xinhua, reported that President Hu Jintao congratulated Obama on his re-election. Hu's message said China-U.S. relations had made positive progress in the past four years as a result of the two nations' joint efforts.

Malaysian Prime Minister Najib Razak expressed his wish that the president's re-election would lead to even greater cross-cultural unity. "My hope," Razak said, "is that President Obama will continue in his efforts to foster understanding and respect between the United States and Muslims around the world."

Egyptian President Mohamed Morsi congratulated his U.S. counterpart, saying in a congratulatory message that he hoped to strengthen "friendly relations between the two countries to serve their common objectives, namely justice, liberty and peace."

And in the streets of Indonesia, where Obama lived as a child, drivers and motorcyclists shouted, "Obama!" The president visited Indonesia in 2010, and has enjoyed great popularity there. "We need someone to lead the world, to maintain peace," a restaurant manager in Jakarta told the *Christian Science Monitor*. "Since Obama has been president, we have seen a good impact for the whole country."

The Brazilian newspaper *Folha de S. Paulo* reported that President Dilma Rousseff formed a heart shape with her hands and said of the president, "I am going to call him to congratulate him."

In a message of congratulations, Indian Prime Minister Manmohan Singh said, "I have no doubt that there is much more we can do together to further strengthen the India-U.S. partnership and thereby advance peace and stability, expand mutual economic opportunities, harness the potential of science and technology, innovation and higher education and empower our people to address global challenges."

Voters Elect Governors in 13 Jurisdictions in November 6 Election

By Bridget Hunter | Staff Writer | 07 November 2012

Washington — Late on November 6, the race for White House was the center of attention as election returns trickled in from across the United States, but results also were being reported in another 13 chief executive contests.

Voters in the states of Delaware, Indiana, Missouri, Montana, New Hampshire, North Carolina, North Dakota, Utah, Vermont, Washington and West Virginia and the territories of American Samoa and Puerto Rico all were selecting their next governors.

In 2012, Republicans held the governorships in 29 states, as compared to the 32 the party held for most of the 1990s, or the record high of 33 in the 1920s. The party had hoped to expand that advantage in the November 6 elections and invested heavily in those races. The Republican Governors Association raised about twice as much money as the Democratic Governors Association for the 2012 election cycle.

Of the 11 contested state governorships in 2012, eight currently are held by Democrats and three by Republicans. Six seats were being defended by incumbents, while five others were "open" seats in which the current governor either is retiring or is barred by term limits from seeking re-election. In the territories, one seat was defended, the other open.

In Missouri, incumbent Governor Jay Nixon, a Democrat who ran on a platform of fiscal conservatism, successfully defended his seat against a challenge by St. Louis businessman Dave Spence. Fellow Democrats Earl Ray Tomblin of West Virginia, Jack Markell of Delaware and Peter Shumlin of Vermont also held onto their offices, as did Republicans Jack Dalrymple of North Dakota and Gary Herbert of Utah.

Governor Luis Fortuño of Puerto Rico, who fell to

challenger Alejandro Garcia Padilla, was the only incumbent governor defeated in the 2012 elections.

OPEN SEATS

The only clear gubernatorial gain for Republicans on the morning of November 7 was in North Carolina, where the Republican candidate, former Charlotte Mayor Pat McCrory, cast himself as a pragmatic centrist and won by a comfortable margin despite a much closer statewide contest for the U.S. presidency.

In New Hampshire, Republican Ovide Lamontagne and former state Senate Majority Leader Maggie Hassan, a Democrat, contended for a seat being vacated by retiring Democrat John Lynch. Hassan's victory kept the seat in Democratic hands.

Indiana will continue to be headed by a Republican, where outgoing Governor Mitch Daniels will be succeeded by Mike Pence.

The successor to Montana's popular Democratic governor Brian Schweitzer remained in question as of midday November 7, when Democratic Attorney General Steve Bullock held a slim lead over former Republican Representative Rick Hill.

Further west, the future of the Washington state governorship also is still to be determined with thousands of ballots yet uncounted in a contest that pitted two candidates who both ran as fiscal moderates. Republican Attorney General Rob McKenna currently trails Democrat Jay Inslee, a former member of the U.S. House of Representatives.

In American Samoa, none of the six candidates running for governor achieved a majority. A runoff election is scheduled for November 20.

GOVERNORSHIP CAN BE TRAINING FOR HIGHER OFFICE

The structure of state governments loosely mirrors that of the U.S. federal government, with executive, legislative and judicial branches. The governor heads the executive branch and performs many of the same functions at the state level that the U.S. president does at the national level: sets policy, appoints department heads, prepares and administers a budget, recommends legislation, and signs laws. In most states, the governor also plays an important role in appointing state and local judges.

In the U.S. system, states have a high degree of autonomy. States cannot enact laws that are in conflict with the U.S. Constitution and cannot engage in activities that are set aside as exclusively federal, such as negotiating treaties,

but have broad jurisdiction in most other areas of governance.

State governors often move on to hold federal posts and many now serve in the U.S. Senate, including Lamar Alexander, Thomas Carper, George Voinovich and Mark Warner.

A Cabinet position could also be a future job for today's governors. In the Obama administration, former Kansas Governor Kathleen Sebelius heads the Department of Health and Human Services, Iowa's Tom Vilsack the Department of Agriculture and Arizona's Janet Napolitano the Department of Homeland Security.

For four decades, the governor's mansion served as a springboard to the U.S. presidency: Jimmy Carter from Georgia, Ronald Reagan from California, Bill Clinton from Arkansas and George W. Bush from Texas.

That pattern was broken November 4, 2008, when Americans for the first time since the 1960 election of John F. Kennedy sent a sitting U.S. senator, Barack Obama, to the White House.

Democrats Retain Control of U.S. Senate

By Phillip Kurata | Staff Writer | 07 November 2012

Washington — President Obama's Democratic Party strengthened its hold on the Senate after winning several hotly contested races November 6.

The Democratic leader in the Senate, Harry Reid, and his Republican counterpart, Mitch McConnell, said the election results show that voters want the two parties to work together.

"Now that the election is over, it's time to put politics aside and work together to find solutions," Reid said. "The strategy of obstruction, gridlock and delay was soundly rejected by the American people. Now, they are looking to us for solutions."

McConnell said he and fellow Republicans are willing to work with President Obama and Democratic lawmakers, provided they move to the political center.

"To the extent he [Obama] wants to move to the political center, which is where the work gets done in a divided government, we'll be there to meet him halfway," McConnell said.

Tim Kaine, a Democrat who won a vigorously contested Senate seat for Virginia, said that voters had sent a message to Washington that they want "cooperative government." Kaine said he is confident lawmakers will be able to defuse a potential fiscal crisis created by

automatic spending cuts and tax hikes set to take effect at the end of 2012 unless Congress acts to address the federal deficit.

Democrat Elizabeth Warren, who unseated Republican Scott Brown in Massachusetts, said she believes there is a lot of room for compromise in Congress to bring down the deficit by cutting spending while raising revenue.

Two Senate seats were taken by Democrats after Republican candidates made incendiary comments about rape and abortion.

Democrat Joe Donnelly from Indiana won a Senate seat that had been held for six terms — 36 years — by Republican Richard Lugar, a respected statesman with a reputation as a moderate. Lugar was defeated in the primary election by a socially conservative Republican, Richard Mourdock. During the general election campaign, Mourdock said he opposed abortion even for women who became pregnant from rape.

The same issue played a role in the Missouri Senate race in which Democrat Claire McCaskill won re-election. Her opponent, Republican Todd Akin, damaged his standing with voters early in the campaign when he said women who are victims of "legitimate rape" do not get pregnant. Republican presidential candidate Mitt Romney denounced Akin's comment and urged Akin to withdraw from the Senate race.

In the next Senate, Democrats are expected to have a 55-45 advantage, assuming that two independents vote with them.

The next Senate will have a record number of women — 20. Tammy Baldwin, a Democrat from Wisconsin, will be the first openly gay senator. Democrat Mazie Hirono is the first woman to represent Hawaii in the Senate.

How News Media Predict Election Winners

By Stephen Kaufman | Staff Writer | 05 November 2012

Washington — As election officials across the United States are counting votes several hours after the polls close on November 6, news media outlets will already be reporting results and confidently declaring which states have been won by President Obama and former Massachusetts Governor Mitt Romney.

Despite the fact that a state's election results are not official until all the votes are counted and the outcome is certified by a state official, usually the day after the election, news media could even declare that Obama or Romney has won the presidency while polls are still open in some western states.

To satisfy the public's news appetite, American news organizations invest substantial resources to "call" (declare the winner of) states as soon as possible after the polls close, by surveying people who have just voted ("exit polls"), and increasingly by polling voters over the phone. In making their projections, the news outlets straddle a fine line between the endless competition to be the first to report the news and the desire to avoid errors and retractions.

NATIONAL ELECTION POOL PROVIDES COMMON DATA SOURCE

ABC News, the Associated Press (AP), CBS News, CNN, Fox News and NBC News created the National Election Pool (NEP) in 2003, the primary source of data behind media predictions on election night.

The organization relies on analysts from Edison Research to conduct and analyze exit polls and make projections.

According to Edison's website, exit polls are administered only minutes after voters have cast their ballots, and along with recording how they voted, the data also provide details that can help analysts understand the motivations and patterns behind their votes, including age, education and other demographic information, and what issues the voters said concerned them.

The data cover not only the presidential vote, but also Senate and House races and important state ballot initiatives. Any news outlet can get the information, but access comes with a \$33,000 price tag.

The NEP and Edison researchers plan to undertake more comprehensive polling in swing states, where they will try to get data journalists can use to draw narrative conclusions about the vote.

With many Americans having voted early, news media are also reaching out to poll voters by phone. They are also identifying precincts that reflect a state's demographics to help predict how the state's population voted as a whole.

On November 6, under the supervision of NEP member representatives, Edison analysts will assess the exit poll data, make predictions and provide all of their results to the subscribing networks beginning at 5 p.m. Eastern Standard Time, after being sequestered for most of the day to prevent any premature release of information.

Each network will then combine the NEP data with its own research and have its experts "call" each state's contests once it feels confidently able to do so.

ELECTION 2000 IS A CAUTIONARY TALE

Journalists have learned that, despite the pressure to be competitive in a 24-hour news cycle, it is better to be correct than to be first. No U.S. election highlighted the pitfalls more effectively than the 2000 presidential contest between George W. Bush and Al Gore.

In that race, where the outcome in the state of Florida would ultimately decide the entire election, television viewers saw the state called for Gore shortly after the polls closed on the evening of November 7. That call was reversed and awarded to Bush a few hours later, and then finally the race in Florida was determined to be "too close to call" in the early morning hours of November 8.

The general public was not the only group suffering from electoral whiplash. According to University of Miami social scientist Joseph Uscinski, once the news media predicted Bush had won Florida, and therefore the presidency, that information "prompted" a telephoned concession call from Gore to Bush. The subsequent announcement that the outcome could not yet be determined led to Gore's placing a second call to Bush to retract his concession. The winner ultimately was decided 35 days later by a U.S. Supreme Court ruling.

New Findings Could Lead to Volcanic Eruption Prediction

By Charlene Porter | Staff Writer | 06 November 2012

Washington — A U.S. scientific team has used data from a Japanese satellite to examine volcanoes in Indonesia, and they've determined that remote observation of one key volcanic feature may point to a method for forecasting eruptions.

Scientists at the University of Miami's Rosenstiel School of Marine and Atmospheric Science analyzed more than 800 images from a satellite operated by the Japanese Space Exploration Agency (JAXA). The images depicted almost 80 volcanoes in Indonesia, taken from 2006 to 2009. The Miami team observed what volcanologists call deformation — that is, inflation of a volcano caused by a rise in its magma prior to an eruption.

"Surveying entire volcanic regions using satellite data is of primary importance to the detection of ground deformation prior to the onset of eruptions," said geophysicist Estelle Chaussard. "If volcanic inflation is observed, it can help us to predict where the next eruption may occur." The discovery could have particular importance in a region like Indonesia, Chaussard said, where there are many volcanoes, but monitoring of their activity with ground instruments is sparse.

The team detected deformation at six volcanic centers,

three of which erupted after the observation period, confirming that inflation is a common precursor of volcanic eruptions on the west arc of the Sunda Islands. This island chain, including Sumatra, Java and the Lesser Sunda Islands, lies on the juncture of several tectonic plates, widely recognized to be volatile geologically.

"The notion of detecting deformation prior to a volcanic eruption has been around for a while," said Miami professor Falk Amelung, who led the study with Chaussard. "Because this region is so volcanically active, our use of InSAR has been very successful. We now have a tool that can tell us where eruptions are more likely to occur."

InSAR refers to interferometric synthetic aperture radar, which works by monitoring radio waves sent between an antenna and its target. The echo waves received at different antenna positions are detected and processed to create an image. The Miami team now intends to use the same technology to study volcanoes in other parts of Indonesia and in the Philippines, where volcanic activity is also common.

"The monitoring of changes to the Earth's surface helps us to better predict the onset of volcanic activity, which can have devastating impacts on human life," Amelung said. "Like with earthquakes and tsunamis, however, we cannot predict activity with certainty, but we hope that new tools like satellite remote sensing will help us to gather critical information in near real time, so we can anticipate the risk of eruptions and deploy [assistance] resources in a timely manner."

NASA and the National Science Foundation provided grants supporting the research. The University of Miami's Rosenstiel School is dedicated to helping communities better understand the planet for development of environmental policies to improve society and quality of life.

NASA Soil-Nutrient Map May Aid Efforts on Food Security, Climate

05 November 2012

Washington — A new analysis led by NASA's Jet Propulsion Laboratory estimates how much the growth of plants worldwide is limited by the amount of nutrients available in their soil. The maps produced from the research will be particularly useful in evaluating how much carbon dioxide Earth's ecosystems may be able to soak up as greenhouse gas levels increase.

A research team led by JPL research scientist Josh Fisher used 19 years of data from NASA, National Oceanic and Atmospheric Administration and international satellites to assess the maximum possible growth of vegetation all

over the world based upon available water and light conditions. The scientists then cross-compared that potential maximum with observed vegetation productivity as measured by satellites. This was the first time such an analysis has been conducted, JPL said.

The map, published recently in the journal *Global Biogeochemical Cycles*, shows the places where vegetation productivity was less than the potential maximum, and then infers that the vegetation in those places was limited by the amount of available soil nutrients there. Results of the study were evaluated using measurements of nutrients and vegetation productivity taken at ground validation sites in Hawaii.

"There are many regions on Earth where vegetation struggles to reach optimum productivity because of sparse nutrients, such as nitrogen or phosphorus," said Fisher. "This reduces global vegetation productivity by nearly a quarter compared to vegetation in a completely fertile Earth."

The mapping could prove valuable information to support global and U.S. efforts to ensure food security and combat climate change.

Ensuring worldwide food security and fighting hunger are major pillars of U.S. foreign policy. The U.S. government's primary food security and global hunger initiative, Feed the Future, has a component that focuses on helping farmers improve productivity.

The U.S. food security effort works in partnership with other nations and international organizations, including the U.N. Food and Agriculture Organization (FAO). FAO Director-General Jacques Diouf warned in September 2011 that pressure on the world's soil resources and land degradation are threatening global food security. He called for a renewed international effort to assure sufficient fertile and healthy soils today and for future generations.

CARBON CYCLES

The vegetation productivity research is also valuable for studying the global carbon cycle, JPL's Fisher said. "Current global carbon cycle models do not, for the most part, account for the cycling of nutrients, so the terrestrial biosphere (forests and other ecosystems), is expected to absorb an increasing amount of atmospheric carbon dioxide," he said. "Our approach provides a way to assess the performance of global carbon models that incorporate the cycling of nutrients to ensure that they accurately reflect the impacts that sparse nutrients have on plant growth."

The team found that tropical forests were more nutrient-

limited than boreal forests, though the range in the amount of nutrients was much larger for boreal forests than tropical forests. North American forests were more nutrient-limited than Eurasian forests. Savannas, grasslands and shrub lands had the fewest nutrients, and croplands had the most.

"We were able to detect known regional gradients in nutrient levels — an East-West gradient across Amazonia, fertilization differences between 'developed' and 'developing' countries, and the migration of trees in boreal North America, for example," said co-author Grayson Badgley of Stanford University, Palo Alto, California.

"It is interesting that we can glean insight on global nutrient cycles from satellite observations of global water and carbon cycles," said co-author Eleanor Blyth of the U.K. Centre for Ecology and Hydrology.

NASA satellite data used in the study included data from the Moderate Resolution Imaging Spectroradiometer instrument on NASA's Terra spacecraft; NASA's Total Ozone Mapping Spectrometer; and the Advanced Microwave Sounding Unit, Advanced Microwave Scanning Radiometer for Earth Observing System, and Atmospheric Infrared Sounder instruments on NASA's Aqua spacecraft.

The California Institute of Technology in Pasadena manages JPL for NASA.

New USAID Policy Highlights Importance of Youth Participation

02 November 2012

Washington — New guidance from the U.S. Agency for International Development (USAID) recognizes young people as a driving force in global development and promotes youth participation as partners and leaders.

USAID's new Youth in Development Policy, announced November 1, supports USAID's efforts to mainstream youth in development, carry out effective programs and elevate youth participation throughout the world.

The 25-page guidance document begins with Secretary of State Hillary Rodham Clinton's words, from a February 2012 speech in Tunisia: "Young people are at the heart of today's great strategic opportunities and challenges, from rebuilding the global economy to combating violent extremism to building sustainable democracies."

With more than half of the global population under the age of 30 and a majority residing in developing countries, USAID said, the new policy "reinforces that young people must be a central focus when developing country

strategies and recognizes the need to support, prepare, engage and protect youth today as well as harness the energy and creativity of young people for positive change."

As articulated in the new policy, USAID seeks to improve the capabilities of young people to achieve their aspirations so they can contribute to and benefit from more stable and prosperous communities.

"These efforts will not only advance youth development and empowerment, but can also help nations accelerate economic growth and capture a demographic dividend," USAID Administrator Rajiv Shah said. "Harnessing this demographic opportunity is not inevitable. It will require strategic, results-oriented investments in youth today."

According to an April 2012 report by the United Nations secretary-general, 1.8 billion of the world's 7 billion people are between 10 and 24 years old and live primarily in the developing world. Even though considerable progress has been made recently in national youth policies, those policies often lack the necessary investments or are not mainstreamed into national policy agendas, the report said, and young people continue to face poverty, high unemployment, inadequate education, poor health and violence.

"The need to invest in young people is more urgent than ever," said Dr. Babatunde Osotimehin, executive director of the United Nations Population Fund, according to the World Health Organization website. "Now it is time to take action."

"Countries still have much to do to fulfill the rights and aspirations of young people," Osotimehin said.

The new USAID policy promotes research and innovation by, with and for youth. Agency policies, country strategies and partnerships will include youth and will actively leverage the skills, priorities and ideas of young people, USAID said.

The policy joins a series of recent USAID policies that guide the agency's focus in the strategic planning process on important issues such as gender equality, climate change and violent extremism.

50 Years into Space Exploration, Scientists Look Ahead

By Kathryn McConnell | Staff Writer | 02 November 2012

Washington — In the 50 years since the dawn of space exploration, astronauts with the U.S. National Aeronautics and Space Administration (NASA) have circled the Earth, walked on the moon, piloted the first winged spacecraft and built the International Space

Station.

And that's not all, NASA scientists noted at the "Solar System Exploration @ 50" symposium October 25-26 in Washington. NASA has engineered robotic spacecraft that have observed the Sun and all its planets, imaged the universe at many wavelengths and, in August, landed a new rover craft, Curiosity, on Mars, the second-closest planet to Earth.

"NASA literally invented planetary science starting in 1962," James Green, the agency's director of planetary science, said at the symposium. "Everything we knew about planetary science up until then we got from the back of a telescope."

Now scientists have "the opportunity to get up close and personal" with many bodies in the solar system, he said.

In February 1962, astronaut John Glenn orbited the Earth aboard the Friendship 7 capsule propelled into orbit by a Mercury spacecraft. The flight put NASA on course to achieve more ambitious goals.

And in August 1962, Mariner 2 sent back valuable atmospheric information about Venus, the Earth's closest planetary neighbor. It was the world's first successful interplanetary mission.

A WALK ON THE MOON

The 10 two-man Gemini space flights of 1965 and 1966 showed that humans could function in space and paved the way for the first trips to the moon.

History was made just three years after the last Gemini flight when Neil Armstrong became the first person to step onto the moon. "That is one small step for a man, one giant leap for mankind," he said during the Apollo 11 mission, summarizing the importance NASA and the world gave to the historic accomplishment. In all, 12 people have set foot on the moon.

The next major step in space exploration came in 1981 with the launch of Columbia, the first space shuttle. The mission showed that a winged spacecraft could take off vertically and glide to an unpowered landing. Unfortunately, in 1986, the shuttle Challenger exploded at takeoff.

The accident demonstrated that space scientists have had "epic success and epic failure" in learning about the solar system, said James Crocker, a vice president of Lockheed Martin Corporation, one of three companies NASA has contracted to study advanced designs for spacecraft that could take to the skies in 2025.

INTERNATIONAL SPACE STATION

Another major accomplishment is the International Space Station, a collaboration involving the United States, Russia, Canada, Japan and the countries participating in the European Space Agency. The first two elements of the station were launched in 1998, and the first crew arrived in 2000. Larger than a football field, the station is the longest continuously inhabited spacecraft and continues to expand the boundaries of space research.

Today the station has state-of-the-art equipment supporting experiments in physics, remote sensing and protein crystallization, plus research into human bones and muscles, radiation, plants and fluids, among other areas.

NASA has engaged other organizations in the space program, including other federal agencies and private companies. In October, Sunita Williams opened the International Space Station's hatch to Space Exploration Technologies' Dragon capsule, the first commercial cargo craft to reach the station.

VOYAGER

NASA's longest-operating spacecraft are Voyager 1 and 2, launched in 1977 and still going strong. Voyager 1 is drawing close to exiting the solar system and entering interstellar space. Voyager 2, the first to launch, is the only spacecraft to explore Uranus and Neptune.

NASA's exploratory space work has reaped technological advancements including digital computers with software that can be quickly revised, nanotechnology, micro-spacecraft, data management techniques and technologies that can be adapted for everyday use, said Peter Westwick, a historian with the University of Southern California. NASA missions also have advanced knowledge of sciences like geology and meteorology, and continue to inspire young people to study math and science, he said.

FUTURE OF SPACE EXPLORATION

Green said future space exploration will include craft collecting samples from interplanetary bodies and returning them to Earth for analysis. It will include rovers that can go beneath Mars' surface and exploration of comets, asteroids and the outer solar system.

As they were when Glenn orbited Earth and Armstrong walked on the moon, people around the world still are in awe of space exploration, Westwick said. He noted that in October, as the retired shuttle Endeavour slowly rolled past onlookers along streets in Los Angeles to its resting spot at the California Science Center, the city's police chief

said he had never seen a crowd “so large and so proud.”

“Our exploration of space has taught us to view the Earth, ourselves and the universe in a new way,” NASA states on its history website.

“We also are humbled by the realization that Earth is just a tiny ‘blue marble’ in the universe,” it says.

(This is a product of the Bureau of International Information Programs, U.S. Department of State. Web site: <http://iipdigital.usembassy.gov>)